

APR - 2 2004

K040711



**SUMMARY OF 510(K) SAFETY AND EFFECTIVENESS**  
**MESACUP Test PR-3**  
March 30, 2004

This summary of 510(k) safety and effectiveness information is being submitted in accordance with the requirements of SMDA 1990 and 21 CFR 807.92.

The MESACUP Test PR-3 is compared to a legally marketed predicate device and a substantial equivalence claim made. The predicate device is Bindazyme Human Anti-PR3 Enzyme Immunoassay Kit (K981029) currently manufactured and marketed by The Binding Site Ltd., Birmingham, U.K.

The MESACUP Test PR-3 is an enzyme-linked immunosorbent assay (ELISA), utilizing the 96-microwell plate format, similar to the predicate device. Diluted serum samples, calibrator sera, and controls are incubated in microwells coated with proteinase III antigen. Incubation allows the anti-PR-3 antibodies present in the samples to react with the immobilized antigen. After the removal of unbound serum proteins by washing, antibodies specific for human IgG immunoglobulins, labeled with horseradish peroxidase (HRP), are added forming complexes with the PR-3 bound antibodies. Following another washing step, the bound enzyme-antibody conjugate is assayed by the addition of a single solution containing tetramethylbenzidine (TMB) and hydrogen peroxide ( $H_2O_2$ ) as the chromogenic substrate. The intensity of the color generated is proportional to the serum concentration of anti-PR-3 antibodies. Optical density is read spectrophotometrically at 450nm. The total incubation time (at room temperature) of the assay is 150 minutes. The assay makes use of two calibrators to measure the amount of anti-PR-3 antibody in patient samples.

The intended use of the device is a semi-quantitative enzyme-linked immunosorbent assay (ELISA) for the detection of IgG anti-proteinase III (PR-3) antibodies in human serum. The MESACUP Test PR-3 is intended for in vitro diagnostic use as an aid in the diagnosis of certain systematic vasculitides such as Wegener's granulomatosis.

Performance indicates that MESACUP Test PR-3 and the Bindazyme Human Anti-PR3 Enzyme Immunoassay are equivalent. In-house studies indicate a clinical specificity of 100% for anti-PR-3 antibodies in a healthy donor serum population on both kits. Additional studies resulted a sensitivity of 35% with a vasculitis population on both assay for anti-PR-3 antibodies compared to IIF ANCA positive results and 87% for both assays specifically for cANCA positive IIF patterns. In general, the performance characteristics are comparable between the two methods (100% relative agreement).

  
Yusuke Kobe

Vice President, Sales and Marketing Department

3/30/2004  
Date



DEPARTMENT OF HEALTH & HUMAN SERVICES

Public Health Service

APR - 2 2004

Food and Drug Administration  
2098 Gaither Road  
Rockville MD 20850

Ms. Nanci Dexter  
Director of Quality/ Regulatory Affairs  
RhiGene, Inc.  
c/o Corgenix, Inc.  
12061 Tejon St.  
Westminister, CO 80234

Re: k040711  
Trade/Device Name: MESACUP TEST PR-3  
Regulation Number: 21 CFR 866.5660  
Regulation Name: Multiple autoantibodies immunological test system  
Regulatory Class: Class II  
Product Code: MOB  
Dated: March 10, 2004  
Received: March 18, 2004

Dear Ms. Dexter:

We have reviewed your Section 510(k) premarket notification of intent to market the device referenced above and have determined the device is substantially equivalent (for the indications for use stated in the enclosure) to legally marketed predicate devices marketed in interstate commerce prior to May 28, 1976, the enactment date of the Medical Device Amendments, or to devices that have been reclassified in accordance with the provisions of the Federal Food, Drug, and Cosmetic Act (Act) that do not require approval of a premarket approval application (PMA). You may, therefore, market the device, subject to the general controls provisions of the Act. The general controls provisions of the Act include requirements for annual registration, listing of devices, good manufacturing practice, labeling, and prohibitions against misbranding and adulteration.

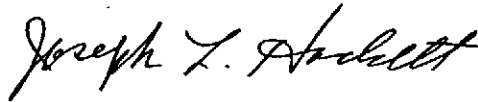
If your device is classified (see above) into either class II (Special Controls) or class III (PMA), it may be subject to such additional controls. Existing major regulations affecting your device can be found in Title 21, Code of Federal Regulations (CFR), Parts 800 to 895. In addition, FDA may publish further announcements concerning your device in the Federal Register.

Please be advised that FDA's issuance of a substantial equivalence determination does not mean that FDA has made a determination that your device complies with other requirements of the Act or any Federal statutes and regulations administered by other Federal agencies. You must comply with all the Act's requirements, including, but not limited to: registration and listing (21 CFR Part 807); labeling (21 CFR Parts 801 and 809); and good manufacturing practice requirements as set forth in the quality systems (QS) regulation (21 CFR Part 820).

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If you desire specific information about the application of labeling requirements to your device, or questions on the promotion and advertising of your device, please contact the Office of In Vitro Diagnostic Device Evaluation and Safety at (301) 594-3084. Also, please note the regulation entitled, "Misbranding by reference to premarket notification" (21CFR Part 807.97). You may obtain other general information on your responsibilities under the Act from the Division of Small Manufacturers, International and Consumer Assistance at its toll-free number (800) 638-2041 or (301) 443-6597 or at its Internet address <http://www.fda.gov/cdrh/dsma/dsmamain.html>.

Sincerely yours,

A handwritten signature in black ink, reading "Joseph L. Hackett". The signature is written in a cursive style with a large, stylized "J" and "H".

Joseph L. Hackett, Ph.D.  
Acting Director  
Division of Immunology and Hematology Devices  
Office of In Vitro Diagnostic Device Evaluation and Safety  
Center for Devices and Radiological Health

Enclosure

### Indications for Use Statement

510(k) Number: K040711

Device Name: MESACUP TEST PR-3

Indications for Use:

The MESACUP TEST PR-3 is a semi-quantitative, enzyme-linked immunosorbent assay (ELISA) for the detection of IgG anti-proteinase III (PR-3) antibodies in human serum. The MESACUP TEST PR-3 is intended for in vitro diagnostic use as an aid in the diagnosis of certain systemic vasculitides such as Wegener's granulomatosis.

The MESACUP TEST PR-3 is intended to be used by clinical (hospital and reference) laboratories.

(PLEASE DO NOT WRITE BELOW THIS LINE - CONTINUE ON ANOTHER PAGE IF NECESSARY)

Concurrence of CDRH, Office of Device Evaluation (ODE)

Prescription Use ✓  
(per 21 CFR 801.109)

OR

Over-The-Counter Use \_\_\_\_\_

Optional Format 1-2-96)

Maria Chan  
Division Sign-Off

Office of In Vitro Diagnostic  
Device Evaluation and Safety

510(k) K040711